

Pajaro River Watershed Long Term Drought Preparedness

ATTACHMENT 4: BUDGET

Attachment 4 is mandatory and includes the estimated costs of the three projects in the Pajaro River Watershed Long Term Drought Preparedness application (Table 4.1):

- Project 1 Hollister Hexavalent Chromium Compliance Project: Planning is complete, this budget includes all activities associated with design, construction and management of the project, as described in the work plan.
- Project 2 Hexavalent Chromium Treatment Project: This is a planning and design project, this budget includes all costs associated with pilot testing and final design of the project, as described in the work plan.
- Project 3 Grant Administration: This project involves grant administration and this budget includes all costs associated with grant management, as described in the work plan.

Table 4.1 – Pajaro River Watershed Long Term Drought Preparedness Proposal Budget

Individual Project Title		(a)	(b)	(c)	(d)	(e)
		Requested Grant Amount	Cost Share: Non-State Fund Source (Match)	Cost Share: Other State Funding Sources	Total Cost	% Funding Match (b/d)
(a)	Project 1. Hexavalent Chromium (Hollister)	\$2,810,565	\$954,535	\$0	\$3,765,100	25%
(b)	Project 2. Hexavalent Chromium (Watsonville)	\$1,924,011	\$214,389	\$42,020	\$2,180,420	10%
(c)	Project 3. Grant Administration	\$202,440	\$49,800	\$0	\$252,240	20%
(d)	Proposal Total	\$4,937,016	\$1,218,724	\$42,020	\$6,197,760	20%
(d)	DAC Funding Match Waiver Total	--	--	--	\$2,180,420	--
(e)	Grand Total	--	--	--	\$4,017,340	30%

4.1 PROJECT NO. 1 HOLLISTER HEXAVALENT CHROMIUM COMPLIANCE

Implementing Agency: San Benito County Water District (SBCWD)

Project Description: On April 15, 2014 the California State Water Resource Control Board (SWRCB) Division of Drinking Water (DDW) issued a final Maximum Contaminant Level (MCL) for hexavalent chromium (Chromium 6) at 10 ppb. The City of Hollister has four existing municipal drinking water wells that currently comprise over 60 percent of the City's public water supply that have Chromium 6 above the MCL. An evaluation identified blending with surface water (supplied by a new separate project, the West Hills WTP Project) as the most cost effective solution to achieve compliance with the State's Chromium 6 regulation.

Table 4.2 contains the budget for the Hollister Hexavalent Chromium Compliance Project (HHCCP) which includes new transmission mains to convey treated surface directly from the West Hills WTP to three of the City's wells, where it will be blended with contaminated groundwater to meet the State's Chromium 6 requirement; the fourth well with Chromium 6 exceeding the MCL will be taken out of service. The budget is based on the latest project documentation as presented in the Hollister Hexavalent Chromium Compliance Plan Report (July 2015).

Table 4.2 – Project Budget					
Proposal Title: Pajaro River Watershed Long Term Drought Preparedness					
Project Title: Hollister Hexavalent Chromium Compliance Project					
Project serves a need of a DAC?: No					
Funding Match Waiver request?: No					
Category		(a)	(b)	(c)	(d)
		Requested Grant Amount	Cost Share: Non-State Fund Source* (Funding Match)	Cost Share: Other State Fund Source*	Total Cost
(a)	Direct Project Administration				
(a1)	Project Management	\$0	\$50,000	\$0	\$50,000
(a2)	Labor Compliance	\$0	\$30,000	\$0	\$30,000
(a3)	Reporting	\$0	\$10,000	\$0	\$10,000
(b)	Land Purchase/Easement	\$0	\$0	\$0	\$0
(c)	Planning/Design/Engineering/Environmental Documentation				
(c1)	Design	\$330,000	\$0	\$0	\$330,000
(c2)	Environmental Documentation	\$110,000	\$0	\$0	\$110,000
(c3)	Permitting	\$0	\$0	\$0	\$0
(c4)	PPMP	\$0	\$2,000	\$0	\$2,000
(c5)	Irrigation Efficiency	\$190,000	\$0	\$0	\$190,000
(d)	Construction/Implementation				
(d1)	Construction Contracting	\$0	\$13,000	\$0	\$13,000
(d2)	Construction	\$2,180,565	\$536,435	\$0	\$2,717,000
(d3)	Environmental Compliance	\$0	\$0	\$0	\$0
(d4)	Construction Administration	\$0	\$313,100	\$0	\$313,100
(e)	Grand Total (Sum rows (a) through (d) for each column)	\$2,810,565	\$954,535	\$0	\$3,765,100
*List sources of funding: Non-state share funds (matching funds) are secured by property tax revenues collected by SBCWD from the landowners in Zone 6 and rate increases for the City of Hollister retail customers.					

The following sections provide additional task detail about the budgets specified in Table 4-2.

BUDGET CATEGORY (A): DIRECT PROJECT ADMINISTRATION (\$90,000)

Direct project administration costs in Budget Category (a) are not a part of the requested grant funding and are submitted for consideration as matching funds.

TASK A1 – PROJECT MANAGEMENT (\$50,000)

This task involves general HHCCP project management activities to be performed by SBCWD staff with support from the design consultants. The general project management work will begin immediately following grant award, will occur over the duration of the project, and will end with the submittal of the project completion report (90 days after final design is complete). All project management activities, including the reporting in Task A3, are assumed to be \$60,000 and equates to approximately 2% of the estimated construction cost, based on prior experience with similar pipeline construction projects. Of the \$60,000, \$50,000 is allocated to the Task A1 and the \$10,000 balance is allocated to Task A3 Reporting.

TASK A2 – LABOR COMPLIANCE (\$30,000)

SBCWD anticipates hiring a consultant to prepare the Labor Compliance Plan and certifying payroll in compliance with the Labor Code. The cost for preparation of the plan and compliance during project implementation is \$30,000 and equates to approximately 1% of the project construction costs, based on the plan and labor compliance work currently being performed for another SBCWD Proposition 84 grant funded project.

TASK A3 – REPORTING (\$10,000)

SBCWD staff will prepare project progress reports detailing work completed during the reporting period for submittal to DWR. The estimate is based on 2% of the construction costs, as described in Task A1. Additionally, SBCWD staff will prepare and submit a project completion report to DWR, within 90 days following project completion.

BUDGET CATEGORY (B): LAND PURCHASE/EASEMENT (\$0)

The proposed facilities will be located within existing public rights of way within the City of Hollister. Thus, no land acquisition or easement costs are anticipated for the HHCCP.

BUDGET CATEGORY (C): PLANNING/DESIGN/ENGINEERING/ENVIRONMENTAL DOCUMENTATION (\$632,000)

Planning is complete. This budget category includes all work necessary to complete design, environmental documentation and permitting for the HHCCP and irrigation efficiency services for the RCD.

TASK C1 – DESIGN (\$330,00)

The HHCCP design is scheduled to start in October 2015. The design consultant will be retained and their budget to complete the design is estimated to be \$330,000. This budget includes development of the preliminary design, 50%, 90%, and 100% design submittals as well as technical tasks to support environmental compliance, project management and as-needed design support tasks. The estimate for the design submittals is based on approximately 4% of construction for preliminary design services and approximately 8% of construction for final design services, benchmarks which are typical for the industry and consistent with costs on similar SBCWD projects.

TASK C2 – ENVIRONMENTAL DOCUMENTATION (\$110,000)

As discussed in the work plan, a Supplemental EIR will likely be required for the HHCCP, which will tier off the 2014 EIR that was prepared for the West Hills WTP Project. The estimated cost to complete this task is estimated at approximately \$110,00 based on approximately 4% of the estimated construction cost.

TASK C3 – PERMITTING (\$0)

The only permit required for the HHCCP is the National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated with Construction Activity from the Regional Water Quality Control Board. The construction permit will be obtained by the contractor and the cost associated it is considered in the construction cost estimate of Task D2. Therefore, this task budget is \$0.

TASK C4 – PROJECT PERFORMANCE MONITORING PLAN (\$2,000)

The Project Performance and Monitoring Plan (PPMP) will be prepared immediately following grant notification. The PPMP will outline how the HHCCP performance will be assessed and evaluated and will be prepared by SBCWD staff. The budget for preparing the plan assumes 25 hours of staff time at a rate of \$80 per hour.

TASK C5 – IRRIGATION EFFICIENCY PROGRAM (\$190,000)

The Irrigation Efficiency Program will be modeled after the successful partnership and program in the Pajaro Valley between the Santa Cruz Resource Conservation District (RCD) and Pajaro Valley Water Management Agency. RCD staff will work with growers to perform and assist with irrigation system evaluations, data analysis and implementation of irrigation system upgrades, irrigation scheduling technology, grower trainings, on-farm performance monitoring and grower surveys to measure program impacts. The budget assumes an RCD staff person, committed to the program at 70% staff time, at a rate of \$95 per hour, for the 18-month duration of the program. This program would be fully funded by grant funds.

BUDGET CATEGORY (D): CONSTRUCTION / IMPLEMENTATION (\$3,043,100)

This budget category includes all costs associated with construction, including monitoring and management activities during construction.

TASK D1 – CONSTRUCTION CONTRACTING (\$13,000)

This task includes the cost to advertise, conduct pre-bid meetings, evaluate bids and award the construction contracts for the HHCCP. The cost is estimated to be approximately \$13,000 and provides adequate budget for 100 staff hours at a rate \$130 per hour.

TASK D2 – CONSTRUCTION (\$2,717,000)

The construction cost for the HHCCP is based on the planning level estimate presented in the Hollister Hexavalent Chromium Compliance Plan Report. The total estimated construction cost is \$2,717,000, broken out by pipeline segment shown below:

- Pipeline from Well No. 5 to Well No. 2 - \$1,580,000
- Westside Pipeline to Well No. 4 - \$1,137,000

TASK D3 – ENVIRONMENTAL COMPLIANCE / MITIGATION / ENHANCEMENT (\$0)

Given the HHCCP construction activities are occurring in existing rights of way, no significant environmental issues are anticipated. The cost for compliance and mitigation, if any, are assumed to be included in the 12% costs for construction administration as described in Task D4.

TASK D4 – CONSTRUCTION ADMINISTRATION (\$313,100)

The cost to administer construction of HHCCP, including construction management, engineering services during construction, and environmental compliance (if required) is estimated to be approximately 12% of the construction cost. The cost for construction management for is estimated at \$313,100. The anticipated work effort is consistent with past experience on similar projects.

4.2 PROJECT NO. 2 HEXAVALENT CHROMIUM TREATMENT PROJECT

Implementing Agency: City of Watsonville

Project Description: On April 15, 2014 the California State Water Resource Control Board (SWRCB) Division of Drinking Water (DDW) issued a final Maximum Contaminant Level (MCL) for hexavalent chromium (Chromium 6) at 10 ppb. The City of Watsonville, a disadvantaged community (DAC), has six critical groundwater wells that comprise nearly three quarters of the City's public water supply that have Chromium 6 above the MCL. A technology evaluation conducted by Corona Environmental Consulting identified reduction/coagulation/filtration (RCF) as a cost effective treatment solution. This project involves the pilot testing and final design of the Chromium 6 treatment system to ensure safe and affordable drinking water for the residents of Watsonville. Additionally, the City is going to use the Chromium 6 treatment project as an opportunity to communicate the importance of ongoing conservation. The City intends to expand on its current conservation outreach approach to incorporate information about hexavalent chromium and the importance of conservation.

Table 4.3 – Project Budget

Proposal Title: Pajaro River Watershed Long Term Drought Preparedness

Project Title: Hexavalent Chromium Treatment Project

Project serves a need of a DAC?: Yes

Funding Match Waiver request?: Yes

Category		(a)	(b)	(c)	(d)
		Requested Grant Amount	Cost Share: Non-State Fund Source* (Funding Match)	Cost Share: Other State Fund Source*	Total Cost
(a)	Direct Project Administration				
(a1)	Project Management	\$100,800	\$0	\$17,280	\$118,080
(a2)	Labor Compliance	\$0	\$0	\$6,500	\$6,500
(a3)	Reporting	\$0	\$0	\$6,720	\$6,720
(b)	Land Purchase/Easement	\$0	\$0	\$0	\$0
(c)	Planning/Design/Engineering/Environmental Documentation				
(c1)	Pilot Testing	\$599,600	\$0	\$0	\$599,600
(c2)	Design	\$1,223,611	\$214,389	\$0	\$1,438,000
(c3)	Conservation Outreach	\$0	\$0	\$9,600	\$9,600
(c4)	Project Performance Monitoring Plan	\$0	\$0	\$1,920	\$1,920
(d)	Construction/Implementation	\$0	\$0	\$0	\$0
(e)	Grand Total (Sum rows (a) through (d) for each column)	\$1,924,011	\$214,389	\$42,020	\$2,180,420

*List sources of funding: *This is a design project meeting a critical water quality need for a DAC; the City of Watsonville is seeking a match waiver. However, due to the limited funding available, some of the costs will be funded by the City of Watsonville through in-kind services and the Water Enterprise Fund.*

BUDGET CATEGORY (A): DIRECT PROJECT ADMINISTRATION

TASK A1 – PROJECT MANAGEMENT (\$118,080)

This task involves general project management activities to be performed by the City of Watsonville staff and project management of the pilot testing and design to be performed by a consultant, as described in the work plan. The general project management work to be performed by City of Watsonville staff will begin immediately following grant award, will occur over the duration of the project, and will end with the submittal of the project completion report (90 days after final design is complete). The estimate assumes 12 hours per month, at a rate of \$80 per hour, for the project duration of 18 months. The project management of the pilot testing and design will be performed by the consultants leading the effort and those consultants have provided an estimate for the work. The estimate assumes 28 hours per month, at a rate of \$200 per hour, for the project duration of 18 months.

TASK A2 – LABOR COMPLIANCE (\$6,500)

Watsonville anticipates hiring a consultant to prepare the plan and certifying payroll in compliance with the Labor Code, if required for any aspect of the project (pilot testing). The cost for preparation of the plan and compliance during project implementation is 1% of the project pilot testing costs.

TASK A3 – REPORTING (\$6,720)

Watsonville staff will prepare project progress reports detailing work completed during the reporting period for submittal to SBCWD for review and inclusion in a progress report to be submitted to DWR. The estimate assumes 12 hours per quarter, at a rate of \$80 per hour, for the project duration of five reporting periods (quarters). Additionally, Watsonville staff will prepare and submit a project completion report to SBCWD for submittal to DWR. The estimate assumes a 24 hours, at a rate of \$80 per hour, for the preparation of the project completion report.

BUDGET CATEGORY (B): LAND PURCHASE/EASEMENT

There are no land or easement requirements for this project.

BUDGET CATEGORY (C): PLANNING/DESIGN/ENGINEERING/ENVIRONMENTAL DOCUMENTATION

The City of Watsonville has completed or is currently completing a significant amount of planning, feasibility studies, and pilot testing at Well 2 for the Hexavalent Chromium Treatment Project (HCTP). This work is not included in the work plan or the budget. Only the following four planning and design tasks are included in the work plan and budget.

TASK C1 – PILOT TESTING FOR WELLS 3, 7, 14, 17 AND 18 (\$599,600)

The City of Watsonville has been working with the engineering consulting firm of Corona Environmental Consulting, LLC and Carollo Engineers, Inc., experts in Cr6 treatment. The consultant team will develop the pilot test plan, manage pilot test operations, and prepares pilot test summary memo and basis of design. The pilot-testing budget is based on a fee estimate prepared by the consultants, as detailed in Table 4.4.

Table 4.4 Pilot Testing Budget Detail			
Classification/Item	Rate	Hours	Total
Vice President	\$225	340	\$76,500
Senior Engineer	\$175	720	\$126,000
Engineer	\$100	1500	\$150,000
Equipment	N/A	N/A	\$72,100
Analytical	N/A	N/A	\$175,000
Total			\$599,600

TASK C2 - DESIGN FOR WELLS 2, 3, 7, 14, 17 AND 18 (\$1,438,000)

The purpose of this task is to finalize plans and outline specifications for the treatment design recommendations for wells 2, 3, 7, 14, 17, and 18. The consultant team will produce the 60-percent, 90-percent, and bid set design submittals. The design budget is based on 11% of the estimated cost to construct the treatment, a standard engineering estimate. As presented in Table 4.5, the conceptual opinion of probable construction costs (AACE Class 4 estimate; +50%/-30% accuracy) range from \$12.4 million to \$22.5 million, with the range representing a American Association of Cost Estimating Class 4 estimate of +50% to -30%. An 11% estimate for design is \$1.8 million. However, this includes \$315,000 for preliminary engineering that has already occurred outside of this grant

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work plan and an additional \$47,000 that was included as project management in Task A1. Therefore, the budget estimate for final design is \$1,438,000. Given the limited funding available, the grant amount available to the City of Watsonville for this task is \$1,223,611 and the balance is shown as cost share.

Table 4.5 Estimated Cost to Construct Treatment Facilities	
	Alternative 1: Blending/RCOF/RCF
Capital (\$M)	\$12.4 - \$22.5
Annual O&M (\$M/year)	\$0.47 - \$1.20
Net Present Worth (\$M)	\$15.9 - \$36.3

TASK C3 – CONSERVATION OUTREACH (\$9,600)

The City intends to expand on its current conservation outreach approach to incorporate information about hexavalent chromium and steps that the City is taking to comply with the regulation. As described in the work plan, the City will produce quarterly outreach updates regarding the status of the Cr6 efforts with reminders of conservation programs and events. The information will be distributed to the residents with their water bills and will be integrated into the City's community program and social media campaign. The budget includes the staff time required to create the hexavalent chromium project specific information in conjunction with conservation program information. The budget assumes 24 hours of staff time per quarter, at a rate of \$80 per hour, for the project duration of five quarters. The printing, mailing and other production costs are already included in the existing conservation program and are not considered additional costs here.

TASK C4 – PROJECT PERFORMANCE MONITORING PLAN (\$1,920)

Watsonville will develop and submit a Project Performance Monitoring Plan, if required. This is a DAC design project and may not require a PPMP. However, if required, the PPMP will be prepared by City staff. The budget assumes 24 hours of staff time at a rate of \$80 per hour.

BUDGET CATEGORY (D): CONSTRUCTION / IMPLEMENTATION

The HCTP is a design project that does not involve construction.

4.3 PROJECT NO. 3 GRANT ADMINISTRATION

Implementing Agency: San Benito County Water District

Project Description: The Pajaro River Watershed IRWM Regional Water Management Group, authorized San Benito County Water District (SBCWD) to act as the applicant and the grant manager for the Proposition 84, IRWM 2015 Grant. SBCWD will administer these funds and respond to DWR's reporting and compliance requirements associated with the grant administration. SBCWD will act in a coordination role: disseminating grant compliance information to the project managers responsible for implementing the projects contained in this agreement, obtaining and retaining evidence of compliance (e.g., CEQA/NEPA documents, reports, monitoring compliance documents, labor requirements, etc), obtaining data for progress reports from individual project managers, assembling and submitting progress reports to the State, and coordinating all invoicing and payment of invoices.

Table 4.6 – Project Budget

Proposal Title: Pajaro River Watershed Long Term Drought Preparedness

Project Title: Grant Administration

Project serves a need of a DAC?: No

Funding Match Waiver request?: No

Category		(a)	(b)	(c)	(d)
		Requested Grant Amount	Cost Share: Non-State Fund Source* (Funding Match)	Cost Share: Other State Fund Source*	Total Cost
(a)	Direct Project Administration				
(a1)	Grant Application	\$0	\$49,800	\$0	\$49,800
(a2)	Agreement Administration	\$71,400	\$0	\$0	\$71,400
(a3)	Invoicing	\$52,920	\$0	\$0	\$52,920
(a4)	Reporting	\$78,120	\$0	\$0	\$78,120
(b)	Land Purchase/Easement	\$0	\$0	\$0	\$0
©	Planning/Design/Engineering/Environmental Documentation	\$0	\$0	\$0	\$0
(d)	Construction/Implementation	\$0	\$0	\$0	\$0
(e)	Grand Total (Sum rows (a) through (d) for each column)	\$202,440	\$49,800	\$0	\$252,240

*List sources of funding: *This is a design project meeting a critical water quality need for a DAC; the City of Watsonville is seeking a match waiver.*

BUDGET CATEGORY (A): DIRECT PROJECT ADMINISTRATION (\$252,240)

The total cost for SBCWD Grant Administration is \$252,240, as shown in the table above. This is approximately 4% of the proposal costs and consistent with grant administration costs for similar grants. A brief summary of the project costs documenting how the budget shown is reasonable based on current available information is shown below.

TASK A1 – PAJARO RIVER WATERSHED LONG TERM DROUGHT PREPAREDNESS GRANT APPLICATION (\$49,800)

This task involves the preparation and submittal of the Pajaro River Watershed Long Term Drought Preparedness Grant Application. The budget for this task is based on an existing contract with Gutierrez Consultants for grant application services. The budget is based on 240 hours at a rate of \$205 per hour plus \$600 in other direct charges. The costs were shared by both project sponsors, SBCWD and the City of Watsonville. Grant funds are not being requested for this task.

TASK A2 – AGREEMENT ADMINISTRATION (\$71,400)

SBCWD will be the grant administrator and be responsible for all grant administration activities as described in the work plan. SBCWD anticipates securing the services of a consultant to perform all grant administration activities. The budget for this task is based on an estimate from Gutierrez Consultants based on similar work for other grants. The cost to coordinate and secure the DWR grant agreement is estimated at 60 hours at a rate of \$210 per hour (\$12,600). The cost to coordinate and secure the City of Watsonville agreements is estimated at 40 hours at a rate of \$210 per hour (\$8,400). The general grant administration and support services are estimated to be xx hours per month for the 30-month term of the grant agreement at a rate of \$210 per hour (\$50,400). These costs are consistent with grant administration costs for similar grants. SBCWD is seeking grant funding for this task.

TASK A3 – INVOICING (\$52,920)

SBCWD will be responsible for compiling invoices for submittal to DWR as described in the work plan. SBCWD anticipates securing the services of a consultant to perform all grant invoicing activities. The budget for this task is based on an estimate from Gutierrez Consultants based on similar work for other grants. The estimate assumes 36 hours per quarter for the first five quarters of the grant, after which the City of Watsonville project is scheduled to be completed (\$37,800). The estimate assumes 24 hours per quarter for the final three quarters of the grant, at a rate of \$210 per hour (\$15,120). These costs are consistent with grant invoicing costs for similar grants. SBCWD is seeking grant funding for this task.

TASK A4 – PROGRESS REPORTS AND PROJECT/GRANT COMPLETIONS REPORTS (\$78,120)

SBCWD will be the grant administrator and be responsible for submitting progress reports, project completion reports, and the grant completion reports to DWR. SBCWD anticipates securing the services of a consultant to perform all grant reporting activities. The budget for this task is based on an estimate from Gutierrez Consultants based on similar work for other grants. The estimate assumes 36 hours per quarter for the first five quarters of the grant, after which the City of Watsonville project is scheduled to be completed (\$37,800). The estimate assumes 24 hours per quarter for the final three quarters of the grant, at a rate of \$210 per hour (\$15,120). Additionally, the budget includes 40 hours for project close-out reporting for the two projects plus an additional 40 hours for the grant completion report, at a rate of \$210 per hour (\$25,200). These costs are consistent with grant reporting costs for similar grants. SBCWD is seeking grant funding for this task.